Performance Evaluation of Information Sharing on the Third-Party Logistics --- A Case Study for a Taiwan Distribution Ce

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ABSTRACT

Today, the Internet is used to a wide range in business. Electronic commerce is a new business circumstance. Customers not only require that the products are complete and correct, but also request many services, including low quantity demand, home delivery, goods tracking, returning or changing goods, and so on. Thus, enterprises must provide a professional and efficient distribution service. However, most of the enterprises are small and medium-sized in Taiwan, which can't establish distribution centers belong to themselves. Consequently, their logistical tasks are subcontracted to the third-party logistics. Moreover, both enterprises and the third-party logistics must rely on information sharing for competitive advantages. This study focuses on the investigation from customers' view to measure the performance of information sharing in the third-party logistics. First, we reviewed related literature to select the evaluating criteria. Then, from the knowledge of domain experts, we adjusted the set of evaluating criteria to match the customers' viewpoint in the real world. By applying the analytic hierarchy process (AHP), we proposed a framework for measuring the performance of the third-part logistics, which includes six dimensions and 22 criteria. Finally, one famous third- party logistics in Taiwan is given as an example, and is used for identifying the effectiveness of our proposed framework. This study obtains some valuable results for those enterprises that want to develop information sharing in the future: 1. The security of information is the most important issue that customers care. However, we find out that the majority of enterprises seem to pay less attention in this issue. Therefore, it is valuable to enhance. 2. Among 22 evaluating criteria, customers indicate the top three which the company in the case study needs to improve. These criteria are information encryption technology, agreement, and appropriate information sharing hierarchy.

Keywords: Third-party logistics, information sharing, performance evaluation, analytic hierarchy process (AHP)

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